

REMARKS

Claims 2-4 and 6-14 are currently pending with claims 2-4 and 6-8 being independent. Claims 1 and 15 have been canceled, and claims 6-8 have been amended to recite a thin film transistor that includes at least a semiconductor layer having a source region and a drain region, a gate insulating film, and a gate electrode. Support for the amendment may be found in the published application at, for example, Figs. 16A and 17, and paragraphs [0182] and [0194]. No new matter has been introduced.

Applicants thank Examiner Pompey for participating in a telephonic interview with applicant's representative on September 26, 2007. The Examiner's interview summary included with the Final Office Action properly reflects the substance of the interview.

Applicants acknowledge with appreciation the Examiner's allowance of claims 2-4, and the Examiner's indication that claims 9-14 are directed to allowable subject matter.

Independent claim 6 has been rejected as being unpatentable over Dubal (U.S. Patent No. 6,704,086) in view of Mikami (U.S. Patent No. 6,115,017). Claim 6, as amended, recites, among other features, forming a first conductive film over a first substrate and forming a first insulating film over the first conductive film. A thin film transistor that includes a semiconductor layer having a source region and a drain region is formed over the first insulating film. A second conductive film is formed over a second substrate, and liquid crystals are provided between the thin film transistor and the second conductive film. An electric field is applied to the liquid crystals by the first conductive film and the second conductive film so that the liquid crystals are made monostable. Applicants request reconsideration and withdrawal of this rejection because neither Dubal, Mikami, nor any proper combination of the two describes or suggest applying an electric field to liquid crystals by a first conductive film and a second conductive film so that the liquid crystals are made monostable, where a thin film transistor having a source region and a drain region is formed between the first conductive film and the second conductive film, as required by claim 6.

While Dubal describes a monostable ferroelectric liquid crystal (FLC) geometry in which the FLC material is oriented with the aid of comparatively high voltages in such a way that only one stable position results, Dubal fails to describe or suggest which conductive film or films are involved in the application of an electric field to generate the high voltage, and, therefore,

necessarily fails to describe or suggest application of an electric field to liquid crystals by two conductive films between which is formed a transistor that includes a semiconductor layer having a source region and a drain region.

Mikami is similarly deficient. The Examiner equates a source region 54 of TFT 10 formed on a TFT substrate with the recited first conductive film and equates an opposed electrode 9 formed on a counter substrate with the recited second conductive film. Notably, Mikami does not describe or suggest that a transistor including a semiconductor layer having a source region and a drain region is formed between the source region 54 of TFT 10 and the opposed electrode 9. Rather, the source region 54 is itself a part of a transistor, i.e., TFT 10, and Mikami does not describe or suggest that another transistor that includes a semiconductor layer having a source region and a drain region is formed over TFT 10 such that it would thereby be formed between source region 54 and opposed electrode 9. Moreover, even if the Examiner were to attempt to equate TFT 10 with the recited transistor formed between the two recited conductive films, Mikami would still be deficient in that it would fail to describe or suggest forming the recited first conductive film because Mikami does not describe or suggest forming any conductive film between TFT 10 and the TFT substrate.

Accordingly, for at least these reasons, applicants request reconsideration and withdrawal of the rejection of claim 6.

Independent claims 7 and 8 have been rejected as being unpatentable over Dubal in view of Mikami and Sako (U.S. Patent No.6,108,061).

Like claim 6, each of claims 7 and 8, as amended, recites the application of an electric field to liquid crystals by a first conductive film and a second conductive film so that the liquid crystals are made monostable, where a thin film transistor having a source region and a drain region is formed between the first conductive film and the second conductive film. Accordingly, applicant requests reconsideration and withdrawal of the rejection of claims 7 and 8 for the reasons discussed above with respect to claim 6 and because Sako, which is cited for the purpose of showing application of an ultraviolet ray to liquid crystals, does not remedy the failure of Dubal and Mikami to describe or suggest the above feature.

Applicant submits that all claims are in condition for allowance.

Applicant : Yoshiharu Hirakata et al.
Serial No. : 09/854,120
Filed : May 10, 2001
Page : 8 of 8

Attorney's Docket No.: 07977-275001 / US4910

The fees in the amount of \$930 which includes (\$810 for RCE and \$120 for the one month extension of time) are being paid concurrently herewith on the Electronic Filing System (EFS) by way of Deposit Account authorization. Please apply any other charges or credits to Deposit Account No. 06-1050.

Respectfully submitted,



Date: February 19, 2008

Roberto J. Devoto
Reg. No. 55,108

Fish & Richardson P.C.
1425 K Street, N.W.
11th Floor
Washington, DC 20005-3500
Telephone: (202) 783-5070
Facsimile: (202) 783-2331